



RAW SEQUENCE LISTING ERROR REPORT

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) detected errors when processing the following computer readable form:

Application Serial Number: 09/319,156
Source: 1648
Date Processed by STIC: 7/25/2001

THE ATTACHED PRINTOUT EXPLAINS DETECTED ERRORS.

PLEASE FORWARD THIS INFORMATION TO THE APPLICANT BY EITHER:

- 1) INCLUDING A COPY OF THIS PRINTOUT IN YOUR NEXT COMMUNICATION TO THE APPLICANT, WITH A NOTICE TO COMPLY or,
- 2) TELEPHONING APPLICANT AND FAXING A COPY OF THIS PRINTOUT, WITH A NOTICE TO COMPLY

FOR CRF SUBMISSION QUESTIONS, PLEASE CONTACT MARK SPENCER, 703-308-4212.

FOR SEQUENCE RULES INTERPRETATION, PLEASE CONTACT ROBERT WAX, 703-308-4216.

PATENTIN 2.1 e-mail help: patin21help@uspto.gov or phone 703-306-4119 (R. Wax)

PATENTIN 3.0 e-mail help: patin3help@uspto.gov or phone 703-306-4119 (R. Wax)

TO REDUCE ERRORED SEQUENCE LISTINGS, PLEASE USE THE CHECKER VERSION 3.0 PROGRAM, ACCESSIBLE THROUGH THE U.S. PATENT AND TRADEMARK OFFICE WEBSITE. SEE BELOW:

Checker Version 3.0

The Checker Version 3.0 application is a state-of the-art Windows based software program employing a logical and intuitive user-interface to check whether a sequence listing is in compliance with format and content rules. Checker Version 3.0 works for sequence listings generated for the original version of 37 CFR §§1.821 – 1.825 effective October 1, 1990 (old rules) and the revised version (new rules) effective July 1, 1998 as well as World Intellectual Property Organization (WIPO) Standard ST.25.

Checker Version 3.0 replaces the previous DOS-based version of Checker, and is Y2K-compliant. Checker allows public users to check sequence listings in Computer Readable form (CRF) before submitting them to the United States Patent and Trademark Office (USPTO). Use of Checker prior to filing the sequence listing is expected to result in fewer errored sequence listings, thus saving time and money.

Checker Version 3.0 can be down loaded from the USPTO website at the following address:
<http://www.uspto.gov/web/offices/pac/checker>

09/319,156

ad

Application No.: _____

**NOTICE TO COMPLY WITH REQUIREMENTS FOR PATENT APPLICATIONS CONTAINING
NUCLEOTIDE SEQUENCE AND/OR AMINO ACID SEQUENCE DISCLOSURES**

The nucleotide and/or amino acid sequence disclosure contained in this application does not comply with the requirements for such a disclosure as set forth in 37 C.F.R. 1.821 - 1.825 for the following reason(s):

- 1. This application clearly fails to comply with the requirements of 37 C.F.R. 1.821-1.825. Applicant's attention is directed to these regulations, published at 1114 OG 29, May 15, 1990 and at 55 FR 18230, May 1, 1990.
- 2. This application does not contain, as a separate part of the disclosure on paper copy, a "Sequence Listing" as required by 37 C.F.R. 1.821(c).
- 3. A copy of the "Sequence Listing" in computer readable form has not been submitted as required by 37 C.F.R. 1.821(e).
- 4. A copy of the "Sequence Listing" in computer readable form has been submitted. However, the content of the computer readable form does not comply with the requirements of 37 C.F.R. 1.822 and/or 1.823, as indicated on the attached copy of the marked -up "Raw Sequence Listing."
- 5. The computer readable form that has been filed with this application has been found to be damaged and/or unreadable as indicated on the attached CRF Diskette Problem Report. A Substitute computer readable form must be submitted as required by 37 C.F.R. 1.825(d).
- 6. The paper copy of the "Sequence Listing" is not the same as the computer readable from of the "Sequence Listing" as required by 37 C.F.R. 1.821(e).
- 7. Other: _____

Applicant Must Provide:

- An initial or substitute computer readable form (CRF) copy of the "Sequence Listing".
- An initial or substitute paper copy of the "Sequence Listing", as well as an amendment directing its entry into the specification.
- A statement that the content of the paper and computer readable copies are the same and, where applicable, include no new matter, as required by 37 C.F.R. 1.821(e) or 1.821(f) or 1.821(g) or 1.825(b) or 1.825(d).

For questions regarding compliance to these requirements, please contact:

For Rules Interpretation, call (703) 308-4216

For CRF Submission Help, call (703) 308-4212

For PatentIn software help, call (703) 308-6856

PLEASE RETURN A COPY OF THIS NOTICE WITH YOUR RESPONSE

RAW SEQUENCE LISTING
PATENT APPLICATION: US/09/319,156

DATE: 07/25/2001
TIME: 12:42:40

Input Set : A:\es.txt
Output Set: N:\CRF3\07252001\I319156.raw

See P.5

3 <110> APPLICANT: PARANHOS-BACCALA, Glaucia
4 KOMURIAN-PRADEL, Florence
5 BEDIN, Frederic
6 SODOYER, Mireille
7 OTT, Catherine
8 MALLET, Francois
9 PERRON, Herve
10 MANDRAND, Bernard
12 <120> TITLE OF INVENTION: RETROVIRAL NUCLEIC MATERIAL AND NUCLEOTIDE FRAGMENTS, IN PARTICULAR,
13 ASSOCIATED WITH MULTIPLE SCLEROSIS AND/OR RHEUMATOID ARTHRITIS, FOR DIAGNOSTIC,
14 PROPHYLACTIC AND THERAPEUTIC USES
16 <130> FILE REFERENCE: 103514
18 <140> CURRENT APPLICATION NUMBER: US/09/319,156
19 <141> CURRENT FILING DATE: 1999-11-02
21 <150> PRIOR APPLICATION NUMBER: PCT/FR98/01460
22 <151> PRIOR FILING DATE: 1998-07-07
24 <150> PRIOR APPLICATION NUMBER: FR/97/08816
25 <151> PRIOR FILING DATE: 1997-07-07
27 <160> NUMBER OF SEQ ID NOS: 45
29 <170> SOFTWARE: PatentIn version 3.0
31 <210> SEQ ID NO: 1
32 <211> LENGTH: 34
33 <212> TYPE: DNA
34 <213> ORGANISM: MSRV
36 <400> SEQUENCE: 1
37 gactcgctgc agatcgattt tttttttttt tttt 34
40 <210> SEQ ID NO: 2
41 <211> LENGTH: 30
42 <212> TYPE: DNA
43 <213> ORGANISM: MSRV
45 <400> SEQUENCE: 2
46 gccatcaagg cacccaaagaa ctcttaactt 30
49 <210> SEQ ID NO: 3
50 <211> LENGTH: 30
51 <212> TYPE: DNA
52 <213> ORGANISM: MSRV
54 <400> SEQUENCE: 3
55 ccaatagcca gaccattata tacactaatt 30
58 <210> SEQ ID NO: 4
59 <211> LENGTH: 310
60 <212> TYPE: DNA
61 <213> ORGANISM: MSRV
63 <400> SEQUENCE: 4
64 gcttatagaa ggacccttag tatgggtaa tccccctctgg gaaaccaagc cccagttactc 60
66 agcaggaaaa atagaatagg aaacacctaca aggacatact ttccctccct ccagatggct 120
68 agccactgag gaaggaaaa tactttcacc tgcagctaac caacagaaaat tacttaaaac 180
70 cttcaccaa accttccact taggcattga tagcacccat cagatggcca aattattatt 240

RAW SEQUENCE LISTING

PATENT APPLICATION: US/09/319,156

DATE: 07/25/2001

TIME: 12:42:40

Input Set : A:\es.txt

Output Set: N:\CRF3\07252001\I319156.raw

72 tactggacca ggcctttca aaactatcaa gaagatagtc aggggctgtg aagtgtgccca 300
 74 aagaataat 310
 77 <210> SEQ ID NO: 5
 78 <211> LENGTH: 103
 79 <212> TYPE: PRT
 80 <213> ORGANISM: MSRV
 82 <220> FEATURE:
 83 <221> NAME/KEY: misc_feature
 84 <222> LOCATION: (26)..(26)
 85 <223> OTHER INFORMATION: Xaa = any amino acid
 88 <400> SEQUENCE: 5
 90 Leu Ile Glu Gly Pro Leu Val Trp Gly Asn Pro Leu Trp Glu Thr Lys
 91 1 5 10 15
 ✓-> 93 Pro Gln Tyr Ser Ala Gly Lys Ile Glu Xaa Glu Thr Ser Gln Gly His
 94 20 25 30
 96 Thr Phe Leu Pro Ser Arg Trp Leu Ala Thr Glu Glu Gly Lys Ile Leu
 97 35 40 45
 99 Ser Pro Ala Ala Asn Gln Gln Lys Leu Leu Lys Thr Leu His Gln Thr
 100 50 55 60
 102 Phe His Leu Gly Ile Asp Ser Thr His Gln Met Ala Lys Leu Leu Phe
 103 65 70 75 80
 105 Thr Gly Pro Gly Leu Phe Lys Thr Ile Lys Lys Ile Val Arg Gly Cys
 106 85 90 95
 108 Glu Val Cys Gln Arg Asn Asn
 109 100
 111 <210> SEQ ID NO: 6
 112 <211> LENGTH: 635
 113 <212> TYPE: DNA
 114 <213> ORGANISM: MSRV
 116 <400> SEQUENCE: 6
 117 ccctgtatct ttaacctcct tgttaagttt gtctttcca gaataaaaac tgtaaaaacta 60
 119 caaatgttc ttcaaatgga gcaccagatg gagtccatga ctaagatcca ccgtggaccc 120
 121 ctggaccggc ctgctagccc atgctcccat gttaatgaca ttgaaggcac ccctcccgag 180
 123 gaaaatctcaa ctgcacaacc cctactatgc cccaaattcag cgggaagcag ttagagcggt 240
 125 catcagccaa cctcccaac agcaattggg tttcctgtt gagagggggg actgagagac 300
 127 aggactagct ggatttccta gccaaacgaa gaatccctaa gcctagctgg gaaggtgact 360
 129 qcatccacct ctaaacatgg ggcttgcaac ttagctcaca cccgaccaat cagagagctc 420
 131 actaaaaatgc taattaggca aaaataggag gtaaagaaat agccaatcat ctattgcctg 480
 133 agagcacagc gggagggaca aggatcggga tataaaccca ggcattcgag ccggcaacgg 540
 135 caaccccctt tgggtccccct cccttgcata gggcgctctg ttttactct atttactct 600
 137 attaaatctt gcaactgaaa aaaaaaaaaaaa aaaaaa 635
 140 <210> SEQ ID NO: 7
 141 <211> LENGTH: 77
 142 <212> TYPE: PRT
 143 <213> ORGANISM: MSRV
 145 <400> SEQUENCE: 7
 147 Pro Cys Ile Phe Asn Leu Leu Val Lys Phe Val Ser Ser Arg Ile Lys
 148 1 5 10 15
 150 Thr Val Lys Leu Gln Ile Val Leu Gln Met Glu His Gln Met Glu Ser

RAW SEQUENCE LISTING
PATENT APPLICATION: US/09/319,156

DATE: 07/25/2001
TIME: 12:42:40

Input Set : A:\es.txt
Output Set: N:\CRF3\07252001\I319156.raw

151	20	25	30	
153	Met Thr Lys Ile His Arg Gly Pro Leu Asp Arg Pro Ala Ser Pro Cys			
154	35	40	45	
156	Ser Asp Val Asn Asp Ile Glu Gly Thr Pro Pro Glu Glu Ile Ser Thr			
157	50	55	60	
159	Ala Gln Pro Leu Leu Cys Pro Asn Ser Ala Gly Ser Ser			
160	65	70	75	
162	<210> SEQ ID NO: 8			
163	<211> LENGTH: 32			
164	<212> TYPE: DNA			
165	<213> ORGANISM: MSRV			
167	<400> SEQUENCE: 8			
168	tgggttcca ttttaagac catctgttagc tt			32
171	<210> SEQ ID NO: 9			
172	<211> LENGTH: 1481			
173	<212> TYPE: DNA			
174	<213> ORGANISM: MSRV			
176	<400> SEQUENCE: 9			
177	atggccctcc cttatcatac ttttctctt actgttctct taccccttt cgctctca			60
179	gcaccccttc catgctgctg tacaaccagt agctccctt accaagagtt tctatgaaga			120
181	acgcggcttc ctggaaatat tgatgccccca tcataatagga gtttatctaa gggaaaactcc			180
183	accttcaactg cccacaccca tatgccccgc aactgctata actctgccac tctttgcatt			240
185	catgcaaata ctcattattt gacaggaaa atgattaatc ctatgttgc tggaggactt			300
187	ggagccactg tctgtggac ttacttcacc cataccagta tgtctgtatgg ggggtggatt			360
189	caaggtcagg caagagaaaa acaagtaaag gaagcaatct cccaaactgac ccggggacat			420
191	agcaccccta gcccctacaa aggacttagt ctctcaaaac tacatgaaac cctccgtacc			480
193	catactcgcc tggtgagcct atttaataacc accctcaactc ggctccatga ggtctcagcc			540
195	caaaacccta ctaactgttg gatgtgcctc cccctgcact tcaggccata catttcaatc			600
197	cctgttcctg aacaatggaa caacttcagc acagaaaataa acaccacttc cgtttttagt			660
199	ggacctcttg ttccaaatct gaaaataacc catacctcaa acctcacctg tgtaaaattt			720
201	agcaataacta tagacacaac cagctcccaa tgcatacggt gggtaacacc tcccacacga			780
203	atagtctgcc taccctcagg aatattttt gtctgtggta cctcagccaa tcattgtttt			840
205	aatggctctt cagaatctat gtgcttcctc tcattcttag tgcccccstat gaccatctac			900
207	actgaacaag atttatacaa tcatgtcgta cctaagcccc acaacaaaag agtacccatt			960
209	cttccttttg ttatcagagc aggagtgcata ggcagactag gtactggcat tggcagttatc			1020
211	acaaccccta ctcaggctta ctacaaacta tctcaagaaa taaatggta catgaaacag			1080
213	gtcactgact ccctggctac ttgcaagat caacttaact ccctagcagc agtagtcctt			1140
215	caaaatcgaa gagctttaga ttgctaaacc gccaaaagag gggaaacctg tttatTTTA			1200
217	ggagaagaac gctgttatta tgtaatcaa tccagaattt gcactgagaa agttaaagaa			1260
219	attcgagatc gaatacaatg tagagcagag gagcttcaaa acaccgaacg ctggggcctc			1320
221	ctcagccaaat ggatccctg gtttccccc ttctttaggac ctctagcagc tctaataattt			1380
223	ttactcctct ttggaccctg tatcttaac ctccctgtta agtttgttc ttccagaatt			1440
225	gaagctgttaa agctacagat gtccttacaa atgaaacccc a			1481
228	<210> SEQ ID NO: 10			
229	<211> LENGTH: 493			
230	<212> TYPE: PRT			
231	<213> ORGANISM: MSRV			
233	<220> FEATURE:			
234	<221> NAME/KEY: misc_feature			

RAW SEQUENCE LISTING
PATENT APPLICATION: US/09/319,156

DATE: 07/25/2001
TIME: 12:42:40

Input Set : A:\es.txt
Output Set: N:\CRF3\07252001\I319156.raw

235 <222> LOCATION: (39)..(39)
 236 <223> OTHER INFORMATION: Xaa = any amino acid
 239 <400> SEQUENCE: 10
 241 Met Ala Leu Pro Tyr His Thr Phe Leu Phe Thr Val Leu Leu Pro Pro
 242 1 5 10 15
 244 Phe Ala Leu Thr Ala Pro Pro Pro Cys Cys Cys Thr Thr Ser Ser Ser
 245 20 25 30
 247 Pro Tyr Gln Glu Phe Leu Xaa Arg Thr Arg Leu Pro Gly Asn Ile Asp
 248 35 40 45
 250 Ala Pro Ser Tyr Arg Ser Leu Ser Lys Gly Asn Ser Thr Phe Thr Ala
 251 50 55 60
 253 His Thr His Met Pro Arg Asn Cys Tyr Asn Ser Ala Thr Leu Cys Met
 254 65 70 75 80
 256 His Ala Asn Thr His Tyr Trp Thr Gly Lys Met Ile Asn Pro Ser Cys
 257 85 90 95
 259 Pro Gly Gly Leu Gly Ala Thr Val Cys Trp Thr Tyr Phe Thr His Thr
 260 100 105 110
 262 Ser Met Ser Asp Gly Gly Ile Gln Gly Gln Ala Arg Glu Lys Gln
 263 115 120 125
 265 Val Lys Glu Ala Ile Ser Gln Leu Thr Arg Gly His Ser Thr Pro Ser
 266 130 135 140
 268 Pro Tyr Lys Gly Leu Val Leu Ser Lys Leu His Glu Thr Leu Arg Thr
 269 145 150 155 160
 271 His Thr Arg Leu Val Ser Leu Phe Asn Thr Thr Leu Thr Arg Leu His
 272 165 170 175
 274 Glu Val Ser Ala Gln Asn Pro Thr Asn Cys Trp Met Cys Leu Pro Leu
 275 180 185 190
 277 His Phe Arg Pro Tyr Ile Ser Ile Pro Val Pro Glu Gln Trp Asn Asn
 278 195 200 205
 280 Phe Ser Thr Glu Ile Asn Thr Thr Ser Val Leu Val Gly Pro Leu Val
 281 210 215 220
 283 Ser Asn Leu Glu Ile Thr His Thr Ser Asn Leu Thr Cys Val Lys Phe
 284 225 230 235 240
 286 Ser Asn Thr Ile Asp Thr Thr Ser Ser Gln Cys Ile Arg Trp Val Thr
 287 245 250 255
 289 Pro Pro Thr Arg Ile Val Cys Leu Pro Ser Gly Ile Phe Phe Val Cys
 290 260 265 270
 292 Gly Thr Ser Ala Tyr His Cys Leu Asn Gly Ser Ser Glu Ser Met Cys
 293 275 280 285
 295 Phe Leu Ser Phe Leu Val Pro Pro Met Thr Ile Tyr Thr Glu Gln Asp
 296 290 295 300
 298 Leu Tyr Asn His Val Val Pro Lys Pro His Asn Lys Arg Val Pro Ile
 299 305 310 315 320
 301 Leu Pro Phe Val Ile Arg Ala Gly Val Leu Gly Arg Leu Gly Thr Gly
 302 325 330 335
 304 Ile Gly Ser Ile Thr Thr Ser Thr Gln Phe Tyr Tyr Lys Leu Ser Gln
 305 340 345 350
 307 Glu Ile Asn Gly Asp Met Glu Gln Val Thr Asp Ser Leu Val Thr Leu
 308 355 360 365

RAW SEQUENCE LISTING
PATENT APPLICATION: US/09/319,156

DATE: 07/25/2001
TIME: 12:42:40

Input Set : A:\es.txt
Output Set: N:\CRF3\07252001\I319156.raw

310	Gln	Asp	Gln	Leu	Asn	Ser	Leu	Ala	Ala	Val	Val	Leu	Gln	Asn	Arg	Arg
311	370						375					380				
313	Ala	Leu	Asp	Leu	Leu	Thr	Ala	Lys	Arg	Gly	Gly	Thr	Cys	Leu	Phe	Leu
314	385						390				395				400	
316	Gly	Glu	Glu	Arg	Cys	Tyr	Tyr	Val	Asn	Gln	Ser	Arg	Ile	Val	Thr	Glu
317						405				410				415		
319	Lys	Val	Lys	Glu	Ile	Arg	Asp	Arg	Ile	Gln	Cys	Arg	Ala	Glu	Glu	Leu
320						420				425				430		
322	Gln	Asn	Thr	Glu	Arg	Trp	Gly	Leu	Leu	Ser	Gln	Trp	Met	Pro	Trp	Val
323						435			440			445				
325	Leu	Pro	Phe	Leu	Gly	Pro	Leu	Ala	Ala	Leu	Ile	Leu	Leu	Leu	Phe	
326						450			455			460				
328	Gly	Pro	Cys	Ile	Phe	Asn	Leu	Leu	Val	Lys	Phe	Val	Ser	Ser	Arg	Ile
329	465					470				475				480		
331	Glu	Ala	Val	Lys	Leu	Gln	Met	Val	Leu	Gln	Met	Glu	Pro			
332						485				490						
334	<210>	SEQ ID NO:	11													
335	<211>	LENGTH:	32													
336	<212>	TYPE:	DNA													
337	<213>	ORGANISM:	MSRV													
339	<400>	SEQUENCE:	11													
340	tcaaaaatcg	a	agagctttag	a	c	t	t	g	c	t	a	a	c	g		32
343	<210>	SEQ ID NO:	12													
344	<211>	LENGTH:	1329													
345	<212>	TYPE:	DNA													
346	<213>	ORGANISM:	MSRV													
348	<220>	FEATURE:														
349	<221>	NAME/KEY:	misc_feature													
350	<222>	LOCATION:	(1232)..(1232)													
351	<223>	OTHER INFORMATION:	n = a, g, c or t/u													
354	<400>	SEQUENCE:	12													
355	tcaaaaatcg	a	agagctttag	a	c	t	t	g	c	t	a	a	c	g		60
357	aggggaagaa	t	gctgttagt	a	t	gtt	a	tca	a	t	c	t	g	g		120
359	aatttgagat	c	gaatataat	g	t	agagcaga	g	gac	c	t	a	c	t	g		180
361	cctcagccaa	t	ggatgcct	g	a	ctctcc	c	t	t	tt	t	g	t	g		240
363	tttactcctc	t	ttggaccct	g	t	atcttcaa	c	ttc	c	t	t	g	t	g		300
365	tgaagctgta	a	agctacaaa	t	agg	tcttca	a	at	g	gaa	accc	c	agat	gc		360
367	aatctaccgt	g	gacccttgg	a	cc	ggc	c	t	g	act	at	t	g	at		420
369	agtcacccct	c	ccgaggaaa	t	c	t	c	a	c	ac	cc	t	a	t		480
371	aagcagttag	a	gcagg	t	tc	agcc	a	cc	a	ac	gt	t	tt	g		540
W-->	373	gggtggactg	a	gag	a	c	g	g	t	g	t	g	g	t		600
W-->	375	anctggaa	g	tgac	cc	t	at	t	tt	a	c	t	g	g		660
	377	accaatcaga	g	ag	c	t	c	a	t	g	c	t	g	g		720
	379	aatcatctat	t	gc	c	t	g	ag	g	ac	g	c	t	g		780
	381	tcaagccag	c	aa	c	g	ca	cc	t	tt	cc	t	tt	g		840
	383	cactctattt	c	act	c	t	t	at	g	cc	t	cc	gt	g		900
	385	ctcaagctga	g	ctt	tt	gtt	c	cc	at	cc	c	ac	gt	g		960
	387	gtgacttcc	a	t	cc	c	tt	gg	a	t	cc	act	g	t		1020
	389	accattgccc	a	c	t	cc	cc	at	g	t	cc	t	g	cat		1080

Use of n and/or Xaa has been detected in the Sequence Listing.
Review the Sequence Listing to insure a corresponding explanation is presented in the <220> to <223> fields of each sequence using n or Xaa.

VERIFICATION SUMMARY
PATENT APPLICATION: US/09/319,156

DATE: 07/25/2001
TIME: 12:42:41

Input Set : A:\es.txt
Output Set: N:\CRF3\07252001\I319156.raw

L:93 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:5
L:247 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:10
L:373 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:12
L:375 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:12
L:395 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:12
L:430 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:13
L:433 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:13
L:1090 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:40